

ABSTRACT OF THE DISCLOSURE

A plasma processing apparatus includes a process chamber having a ceiling with an opening, a supporting frame member placed along the periphery of the ceiling and including a ring-shaped supporting shelf protruding toward the center of the process chamber, and an insulating plate having its peripheral portion supported by the supporting shelf of the supporting frame member and airtightly covering the opening of the ceiling of the process chamber. The plasma processing apparatus is characterized in that the supporting shelf has an inner periphery which includes a corner portion shaped into a curve.